California Regional Water Quality Control Board North Coast Region

Monitoring and Reporting Program No. R1-2000-59 (Revised December 30, 2004)

for

Crescent City Harbor District Maintenance Dredging

Del Norte County

The purpose of this monitoring program is to demonstrate that the requirements of Order No. R1-2000-59 are being met. The program calls for routine monitoring at regular intervals during and following dredging operations.

Dredging Records

Dredging activity shall be reported daily as "none" if the dredge is inactive, or "pond" if the dredge is placing spoil in the pond, or "beach" if the dredge is placing spoil at the Whaler Island disposal site.

Effluent Monitoring

Effluent grab samples shall be collected daily when the dredge spoil pond overflows. Samples shall be analyzed for turbidity (as NTU) and settleable solids (as mL/L). "Dry" shall be reported in place of sample results for each day of dredging not producing dredge spoil pond overflow.

Annually, on the first day of dredge spoil pond overflow or dredge discharge to the Whaler Island disposal site during a calendar year, a chronic toxicity bioassay shall be conducted using a sample of the discharge. During the first year, test organisms shall include topsmelt *Atherinops affinis*, red abalone *Haliotis rufescens*, and giant kelp *Macrocystis pyrifera*. The sensitivity of these three test organisms shall be determined during the first year of testing, and subsequent chronic toxicity bioassays shall use only the critical life stage of the most sensitive of the three organisms.

Receiving Water Monitoring

Receiving water samples shall be collected daily, within one hour of high tide, when the dredge spoil pond overflows or the dredge is placing spoil at the Whaler Island disposal site. These samples shall be analyzed for turbidity. One sample shall be taken near the ice house at the end of Citizens Dock Road, and the other shall be taken within 200 feet of the point of entrance of the discharge into the Ocean.

Annual Survey

An annual biological survey of the Whaler Island disposal site shall be conducted during the summer following use of the site for dredge disposal. Observation sites shall be established – one on the seaward side the groin extending southeasterly from Whaler Island, and the other on the opposite side of the groin. For each observation site the marine biologist conducting the survey shall quantify and report the density of colonization for each marine species observed.

A physical survey by a licensed land surveyor shall be made of the beach elevations within the groin during minus tides at approximately the same time as the biological survey. A map of the survey results shall be submitted with the monitoring report for the month of the survey.

Monitoring and Records

Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity.

The discharger shall calibrate and perform maintenance procedures in accordance with manufacturer's specifications on all monitoring instruments and equipment to ensure accurate measurements.

Records of monitoring information shall include:

- 1. The date, exact place, and time of sampling or measurements;
- 2. the individuals who performed the sampling or measurements;
- 3. the date(s) analyses were performed;
- 4. the individual(s) who performed the analyses;
- 5. the analytical techniques or methods used;
- 6. the results of such analyses;
- 7. the method detection limit; and
- 8. the practical quantitation level (PQL) or the limit of quantitation (LOQ).

Unless otherwise noted, all sampling and sample preservation shall be in accordance with the current edition of "Standard Methods for the Examination of Water and Wastewater" (American Public Health Association.)

All permit applications, reports, or information submitted to the Regional Water Board shall be signed by either a principal executive officer or ranking elected official of Crescent City Harbor District.

Any person signing a document under this monitoring and reporting program shall make the following certification: "I certify under penalty of perjury that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment."

Reporting

Monitoring reports shall be submitted to the Regional Water Board for each month on or before the last day of the following month. Reports shall be submitted on a form similar to the attached example.

Ordered by:	Catherine E. Kuhlman Executive Officer
	December 30, 2004

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